

Assessment of the suspended sediment yield in the rivers' basin of the russian plain

Yermolaev O.

Kazan Federal University, 420008, Kremlevskaya 18, Kazan, Russia

Abstract

The forest-steppe landscapes on the east of the Russian Plain possess favourable agro-climatic resources. The evaluation of the suspended sediment yield was performed for the rivers' basin of the East Russian Plane. The following aspects of the subject were being studied: examination of the calculated values of suspended sediment yield in the small rivers' basins on the mathematical - statistical model of the sediment load; building the map of spreading the sediment yield; studying the suspended sediment yield spatial trends in the small rivers' basins. The study area is located within the forest, forest-steppe and northern part of the steppe landscape of the Russian Plain and comprises more than 130 000 km². The calculated values of sediment yield module for each of 3331 basins of the examined territory were calculated. © IDOSI Publications, 2013.

<http://dx.doi.org/10.5829/idosi.wasj.2013.27.05.13693>

Keywords

Correlation analysis, Erosion processes, Landscapes, Mathematical statistical model, Russian plain, Suspended sediment yield